

Amendments to the Claims:

This listing of claims will replace all prior versions, and listings, of claims in the application:

Listing of Claims:

Claims 1-21 (cancelled).

22 (currently amended). A method as recited in claim ~~24~~ 23, wherein said combining modifies the source device to profile connection space transform with a source to destination gamut mapping transform.

23 (currently amended). ~~A method as recited in claim 21, A method comprising:~~

obtaining a source device to profile connection space transform and a destination device to profile connection space transform;

combining the source device to profile connection space transform and the destination device to profile connection space transform, thereby producing a device to device transform;

operating on a file with the device to device transform, thereby forming a modified file; and

outputting the modified file to the destination device;

wherein said combining combines the destination device to profile connection space transform with an inking manifold matching input dimensions of the destination device to profile connection space transform with output dimensions of the destination device to profile connection space transform.

24 (previously presented). A method as recited in claim 23, wherein the inking manifold controls ink utilization.

25 (currently amended). The method of claim ~~24~~ 23, wherein the file is a digital image file.

26 (previously presented). The method of claim 25, wherein the modified file is displayed by the destination device.

27 (previously presented). A method of creating a composite transformation converting a color in a source space into a color in a destination space using [device > PCS] transformations for a source and destination device, comprising:

modifying a domain of the [device > PCS] transform from a destination device profile with an ink manifold producing a modified [device > PCS] transform with three input dimensions;

modifying a range of the [device > PCS] transform from a source device profile producing PCS coordinates all within the range of the modified [device > PCS] transform;

inverting the modified destination [device > PCS] transform using values in the modified source [device > PCS] transform to produce a [device > device] transform;

modifying a range of the [device > device] transform by applying the inking manifold transform to yield coordinates in the domain of the destination device, thereby producing a modified [device > device] transform; and

using the modified [device > device] transform to convert a color in a source space input by a source device into a color in a destination space; and
outputting the color in the destination space to the destination device.

28 (previously presented). A method as recited in claim 27, wherein user preference information, concerning one of the ink manifold and a gamut mapping, is one of a default and extracted from the profiles.

29 (previously presented). A method as recited in claim 27, wherein the inking manifold is the identity.

30 (previously presented). A method as recited in claim 27, wherein the [device > PCS] transformations are one of: tags in a profile; polynomials; and multi-dimensional interpolation tables.

31 (previously presented). A method as recited in claim 27, wherein the [device > device] transform is saved as a device link.

32 (previously presented). A method for producing a composite transform from one device A color space to device B color space ([device A > device B]), comprising:

modifying a [device A > PCS] where colors are within the range of the [device B > PCS] transform and account for non-colorimetric requirements;

modifying a [device B > PCS] making the [device B > PCS] invertible by adding additional output channels and adding equivalent output channels to the [device A > PCS] transform;

inverting the modified [device B > PCS] transform for each value in the modified [device A > PCS] transform, thereby forming an inverted [device B > PCS] transform;

using the modified [device > device] transform to convert a first color in device A color space into a second color in device B color space; and

outputting the second color to device B.

33 (previously presented). A method as recited in claim 32, wherein the added output channels comprise a mathematical function expressing ink utilization preferences.

34 (previously presented). A method for producing a composite [device > device] transform from a source device color space to a destination device color space [device > device] transform, comprising:

modifying a destination [device > PCS] transform having a destination device color space to have a unique inverse producing a modified destination [device > PCS] transform;

modifying a source [device > PCS] transform to have a range contained in a range of the modified destination [device > PCS] transform;

inverting the modified destination [device > PCS] transform for each value in the modified source [device > PCS] transform, thereby forming a [device > device] transform;

converting contents of the resulting [device > device] transform back to the destination device color space, thereby producing a composite [device > device] transform; and

utilizing the composite [device > device] transform to convert a color input from a source device to a color that is output to a destination device.

35 (previously presented). A method of creating a composite transformation converting a color in a source space from a source device into a color in a destination space for a destination device, comprising:

obtaining [device > PCS] transformations for a source and destination device each having multi-dimensional interpolation tables and obtaining user preference information extracted from the profiles;

modifying a domain of the [device > PCS] transform from a destination device profile with an ink manifold transform, thereby producing three input dimensions that are used to produce a modified [device > PCS] transform, where the inking manifold controls gray component replacement;

modifying a range of the [device > PCS] transform from a source device profile such that the PCS coordinates are all within the range of the modified [device > PCS] transform and are responsive to the user preference gamut mapping information;

inverting the modified [device > PCS] transform using values in the source transform range to produce a [device > device] transform;

modifying a range of the [device > device] transform by applying the inking manifold transform to yield coordinates in the domain of the destination device; and

transforming an image from the source device into an image for the destination device using the [device > device] transform.

36-51 (cancelled).